

from the lot of 20,300 odd ringed by the BNHS field party in Kerala between December 1962 and February 1963. The recovery of the Forest Wagtail in the Chin Hills is of particular interest since we know even less about its movements than of other migratory wagtails. It is a species that normally breeds in NE. Asia. Nesting has also been reported in the N. Cachar Hills of Assam but doubts have been cast on this report. Its migration route/s to and from SW. India and Ceylon is/are unknown. The speculation is that this wagtail either follows the Eastern Ghats or goes partly over the Bay of Bengal via the Andamans.

It is a question whether the ringed bird had arrived at its destination in the Chin Hills or how much further it still had to travel to its breeding grounds. The reporter states that it was shot by a boy with a catapult, and that it was by itself and not in a party.

BOMBAY NATURAL HISTORY SOCIETY,
91, WALKESHWAR ROAD,
BOMBAY 6-WB,
May 27, 1963.

EDITORS

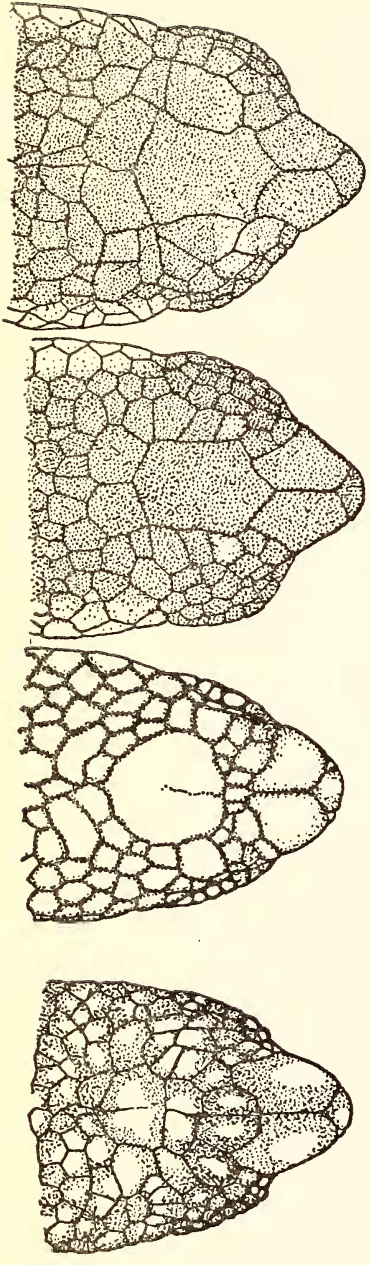
11. *TESTUDO HYPSELONOTA* BOURRET REFERRED TO *GEOCHELONE RADIATA* (SHAW)

(With a plate)

While working on the preparation of a checklist of Recent and fossil land tortoises of the world the validity of the Recent species *Testudo hypselonota* Bourret was investigated. This contribution is the result of that short study.

Bourret (1941) described a presumably new species of Recent land tortoise on the basis of a single specimen in the Botanical Gardens of Saigon, to which he gave the name of *Testudo hypselonota*. Bourret stated quite clearly that the exact origin of the specimen was unknown, and that it is not even certain that it was found in Indochina. "Malheureusement l'origine exacte de cette Tortue, provenant d'un Chinois de Cholon qui l'avait lui-même achetée au marché de cette ville, n'est pas connue, et il n'est pas certain qu'elle ait été trouvée en Cochinchine."

Unfortunately, more recent authors, such as Wermuth & Mertens (1961), have failed to recognize the questionable Indochinese origin of the specimen, and have assumed that only the exact locality was unknown. "Verbreitung: Indochina (nähere Fundort-Angaben liegen nicht vor). . . , Terra Typica: Cholon?" (p. 213).

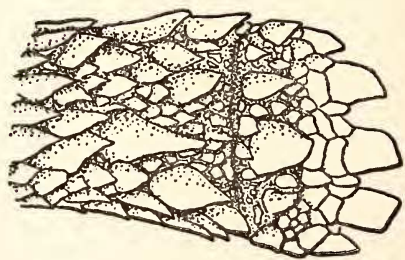


A

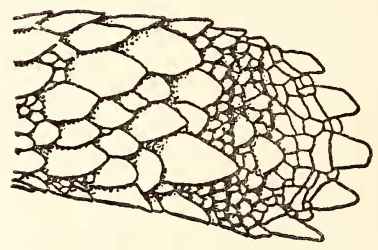
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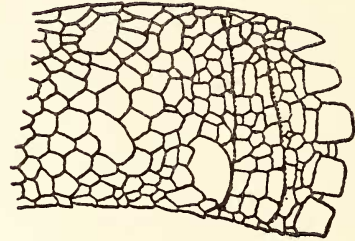
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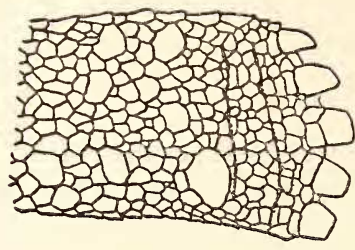
E



F



G



H

The scalation of the top of the head (A-D) and the antebrachium (E-H) of four specimens of tortoises

A and E. *Geochelone elongata*. Mt. Abu, Gujarat State, India. WA 350. B and F. *Geochelone nilotunota*. Burma.
C and H. *Geochelone radiata*. Western Madagascar. WA 451

Bourret distinguished *Geochelone* (as *Testudo*) *hypselonota* from the two somewhat similar Asian species, *Geochelone elegans* and *Geochelone platynota*, on the following characters: from both species by (1) the presence of a nuchal scute, (2) the absence of a scale or spur at the tip of the tail, and (3) the colour of the upper part of the head—black in *G. hypselonota* and light in the other two. In addition, it differs from *G. elegans* by (1) the absence of tubercles or spurs on the heel and on the back of the thigh, (2) the small number of yellow rays on the scutes of the carapace, and (3) the presence of a frontal and two rather distinct prefrontals. It differs from *G. platynota* by the plastral pattern as well.

In his description Bourret states that the shell of this tortoise is particularly bombous, and that its sides are inclined inwards below; the large, single supracaudal scute is convex; the mandibles are feebly denticulated, and the upper jaw is bidentate at the front. He states that *G. hypselonota* closely resembles *Geochelone radiata* of Madagascar, but that the former is much more elongate.

Wermuth & Mertens place *Geochelone hypselonota* close to *G. radiata* in their key (p. 187), separating it from the latter on the basis of a presumed flattening of the middle of the carapace, and that the outer surface of the front leg is supposedly covered with small scales in *G. hypselonota* and large scales between smaller ones in *G. radiata*.

All the presumed diagnostic characters given by Bourret and by Wermuth & Mertens, as well as several additional ones, are commented upon below in an attempt to clarify the relationship of *G. hypselonota* to the three similar species, *platynota*, *elegans*, and *radiata*.

Nuchal scute. Absent in *platynota* and *elegans*, present in *radiata* and *hypselonota*.

Tubercles on thigh. Present in *platynota* and *elegans*, absent in *radiata* and *hypselonota*.

Terminal tail spur. Present in *platynota* and *elegans*, absent in *radiata* and *hypselonota*.

Second costal shape. Same width dorsally and ventrally in *platynota* and *elegans*, wider dorsally than ventrally in *radiata* and *hypselonota*.

Heel scales or spurs. Usually enlarged in *platynota* and *elegans*, never enlarged in *radiata* and *hypselonota*.

Inguinal scute. Relatively small in *platynota* and *elegans*, relatively large in *radiata* and *hypselonota*.

Position of the femoro-abdominal sulcus. Distance to hypo-xiphial suture less than anal length in *platynota* and *elegans*, distance to hypo-xiphial suture equals anal length in *radiata* and *hypselonota*.

Shape of the pleural bones. Not noticeably alternately wider and narrower distally in *platynota* and *elegans*, noticeably alternately wider and narrower distally in *radiata* and *hypselonota*.

Supracaudal scute. Dorsal width almost equal to ventral width of 1st suprapygal in *platynota* and *elegans*, dorsal width much less than ventral width of the 1st suprapygal in *radiata* and *hypselonota*.

Head scalation. Essentially the same in all four described species (Plate, fig. A-D).

Head coloration. Each scale on the top and sides of head usually with a light centre and black or brown border in *platynota* and *elegans*, black on top, sharply set off from white or yellowish sides in *radiata* and *hypselonota* (Plate, fig. A-D).

Number of costal scute rays. The number of rays on the scutes of the carapace of these species is not significant. The number of rays in *radiata*, *platynota*, and *hypselonota* are relatively few. Within *elegans* there seems to be a north-south cline, in which specimens from northern India have proportionately more rays on each scute than those from southern India and Ceylon.

Plastral pattern. Though the ventral coloration and pattern are variable in all three of the valid species with which *hypselonota* is compared, the basic pattern is the same. A series of black or brown rays of varying thickness diverge from the edges of the juvenile areoli. The widest back rays are always found in the anterior and/or posterior edges of the plastral scutes.

Shell shape. Bourret (p. 9) and Wermuth & Mertens (p. 187) refer to the presumed differences in shell shape between *hypselonota* and *radiata*. Bourret describes the shell of the type and only known specimen of *hypselonota* as bombous, and like that in *radiata*, except that the shell is narrower. His illustration clearly shows the almost even convexity of the carapace of the type, with the central areas of each scute only slightly raised. However, Wermuth & Mertens state that the middle of the shell is flattened in *hypselonota*, and their accompanying figure (p. 213) would indicate that the anterior portion rises quite abruptly. Bourret's illustration is clearly more carefully done in many details (width of the shell compared to its length, shape of the inguinal scute, coloration of the head, etc.). The presumed